

Description of the Designation/Classification Layer in Air Quality-GIS:

Federal Standards

COVERAGE NAME: FED_OZONE

Concise Summary:

This layer is a statewide polygon coverage for Federal Ozone Designation and Classification, which together give an indication of the air quality status of areas in California with respect to the **Federal 1-hour standard for ozone**.

The Federal “**Designation**” indicates whether an area is in compliance with the National Ambient Air Quality Standard for a specific pollutant. Federal Designations are made by the U.S. Environmental Protection Agency (US EPA), on a periodic basis using the most recent monitoring data. For California, the following Designations are used for 1-hour ozone:

- Nonattainment: The National 1-hour standard for ozone is either currently violated in the area; or the standard is not currently violated but has been violated for a period since 1990, and a maintenance plan has not been approved that would allow the area to be formally re-designated to attainment. Federal conformity requirements apply.
- Attainment-Maintenance: The area was designated as nonattainment for ozone at the time of the 1990 Clean Air Act Amendments, but the National 1-hour standard for ozone is not currently violated in the area, and US EPA has officially declared the area as currently in attainment. A maintenance plan has been approved to keep the area from violating the standard again. Conformity requirements also apply.
- Attainment: The National 1-hour standard for ozone was not violated at the time of the 1990 Clean Air Act Amendments, and the area has never been declared nonattainment since. Conformity requirements do not apply.
- Unclassified: There are insufficient data to indicate whether the National 1-hour ozone standard is violated in the area. Conformity requirements do not apply. Note: This term is intended to indicate that there is no designation, **not** that there is no classification (also see below) – it is a misnomer widely used in air quality.
- Unclassified/Attainment: This is to indicate that the area may be considered as being designated either "Unclassified" or "Attainment". In most cases, there were insufficient data available, but the designating agency had determined that the area may be considered as "Attainment" even in the absence of complete data, or that there was not substantial difference in the definitions between the two categories for this pollutant.

The “**Classification**” is a subdivision within the Nonattainment designation, and is only assigned to nonattainment areas. Classifications indicate the degree of severity of the air quality problem in an area, the level of emission control requirements, and the time schedule allowed for attaining the standard. The classification of an area is based not only on air quality data, but also on negotiations among federal, state, and local agencies. Federal ozone nonattainment areas are assigned one of the following Classifications (listed generally from worst to best air quality):

- Extreme;
- Severe;
- Serious;
- Moderate;
- Transitional/Section 185A;
- Nonattainment-No Classification: Some nonattainment areas do not have classifications, and are indicated by the label “Nonattainment-No Classification.”
Note: These are *not* the same as Unclassified areas (see explanation above for “Unclassified”).)
- Nonattainment-No Classification - Design Value Equivalent to Moderate: This is a special case of "Nonattainment-No Classification", where the nonattainment area does not have an official Classification, but the area is treated as if it were classified as "Moderate" for control strategy, attainment dates, and other purposes.

Certain areas with no classification are classified for the Congestion Mitigation and Air Quality (CMAQ) funding program purposes only, and carry no classification under the Clean Air Act. To cover the “no classification” and “CMAQ” situations, the following pseudo-classifications are allowed, for CMAQ purposes only:

- No Classification;
- CMAQ–Extreme;
- CMAQ–Severe;
- CMAQ–Serious;
- CMAQ–Moderate.

As of July 1, 2003, the only “CMAQ” pseudo-classification in use was “CMAQ–Moderate”, for the San Francisco Bay Area, for the 1-hour ozone standard. “CMAQ” pseudo-classifications may be used more extensively in the future for the 8-hour ozone standard.

COVERAGE NAME: FED_CO

Concise Summary:

This layer is a statewide polygon coverage for Federal Carbon Monoxide (CO) Designation and Classification, which together give an indication of the air quality status of areas in California with respect to the Federal standards for CO.

The Federal “**Designation**” of an area indicates whether the area is in compliance with the National Ambient Air Quality Standard(s) for a specific pollutant. Federal Designations are made by the U.S. Environmental Protection Agency (US EPA), on a periodic basis using the most recent monitoring data. For areas in California, the Designations with respect to the National standards for carbon monoxide (CO) [1-hour and 8-hour averages] are as follows:

- Nonattainment: One or both of the National standards for CO is/are currently violated in the area. Federal conformity requirements apply.
- Attainment-Maintenance (Nonattainment was Urbanized Area only): The area was designated as nonattainment at the time of the 1990 Clean Air Act Amendments, but neither of the National standards for CO is currently violated in the area, and US EPA has officially declared the area as currently in attainment. A maintenance plan has been prepared to keep the area from violating the standard(s) again. This label refers to the original urbanized area that was designated nonattainment (contrast this to the next designation label, directly below.) Conformity requirements also apply.
- Attainment-Maintenance (Area of Regional Conformity Budget): This area is generally the remainder of the county of an urbanized area of CO nonattainment. The area was **not** part of the original CO nonattainment area, and has never been declared nonattainment. However, the local planning agency has elected to use the transportation network of the entire county in its air quality modeling work. In this process, the urbanized area’s CO emission budget used for conformity determination would apply to the entire county. Conformity requirements also apply here.
- Attainment: The National standards for CO were not violated at the time of the 1990 Clean Air Act Amendments, and the area has not been declared nonattainment since. Conformity requirements do not apply. Note: For CO, the Federal “Attainment” designation is not specifically distinguished from the “Unclassified” designation.
- Unclassified: There are insufficient data to indicate whether the National standards are violated in the area. Conformity requirements do not apply. Note: This term is intended to indicate that there is no designation, **not** that there is no classification (see below for definition) – it is a misnomer widely used in air quality.
- Unclassified/Attainment: This is to indicate that the area may be considered as being designated either "Unclassified" or "Attainment". In most cases, there were insufficient data available, but the designating agency had determined that the area may be considered as "Attainment" even in the absence of complete data, or that there was not substantial difference in the definitions between the two categories for this pollutant.

The “**Classification**” is a subdivision within the Nonattainment designation, and is only assigned to nonattainment areas. Classifications indicate the degree of severity of the air quality problem in an area, the level of emission control requirements, and the time schedule allowed for attaining the standards. The classification of an area is based not only on air quality data, but also on negotiations among federal, state, and local agencies. Among Federal CO nonattainment areas in California, only the “Serious” Classification is currently in use, but the following Classifications are allowed:

- Serious;
- Moderate;
- Nonattainment-No Classification: Some nonattainment areas do not have classifications, and are indicated by the label “Nonattainment-No Classification.”
Note: These are *not* the same as Unclassified areas (see explanation above for “Unclassified”).)

COVERAGE NAME: FED_PM10

Concise Summary:

This layer is a statewide polygon coverage for Federal Particulate Matter (PM10) Designation and Classification, which together give an indication of the air quality status of areas in California with respect to the Federal standards for PM10.

The Federal “**Designation**” of an area indicates whether the area is in compliance with the National Ambient Air Quality Standard(s) for a specific pollutant. Federal Designations are made by the U.S. Environmental Protection Agency (US EPA), on a periodic basis using the most recent monitoring data. For areas in California, the Designations with respect to the National standards for particulate matter (PM10) [24-hour and annual averages] are as follows:

- Nonattainment: One or both of the National standards for PM10 is/are either currently violated in the area; or the standards are not currently violated but have been violated for a period since 1990, and a maintenance plan has not been approved that would allow the area to be formally re-designated to attainment. Federal conformity requirements apply.
- Attainment: The National standards for PM10 were not violated at the time of the 1990 Clean Air Act Amendments, and the area has not been declared nonattainment since. Conformity requirements do not apply. Note: For PM10, the Federal “Attainment” designation is not specifically distinguished from the “Unclassified” designation.
- Unclassified: There are insufficient data to indicate whether the National standards for PM10 are violated in the area. Conformity requirements do not apply. Note: This term is intended to indicate that there is no designation, *not* that there is no classification (see below for definition) – it is a misnomer widely used in air quality.
- Attainment-Maintenance: A PM10 nonattainment area at the time of the 1990 Clean Air Act Amendments was subsequently re-classified as “Attainment-Maintenance,” because air quality monitoring indicated no violations of the standards and the US EPA has approved the area’s strategy for maintaining attainment in its PM10 State Implementation Plan (SIP).
- Unclassified/Attainment: This is to indicate that the area may be considered as being designated either “Unclassified” or “Attainment”. In most cases, there were insufficient data available, but the designating agency had determined that the area may be considered as “Attainment” even in the absence of complete data, or that there was not substantial difference in the definitions between the two categories for this pollutant.

The “**Classification**” is a subdivision within the Nonattainment designation, and is only assigned to nonattainment areas. Classifications indicate the degree of severity of the air quality problem in an area, the level of emission control requirements, and the time schedule allowed for attaining the standards. The classification of an area is based not only on air quality data, but also on negotiations among federal, state, and local agencies. Federal PM10 nonattainment areas are assigned one of the following Classifications (listed from worst to best air quality):

- Serious;
- Moderate;
- Nonattainment-No Classification: Some nonattainment areas do not have classifications, and are indicated by the label “Nonattainment-No Classification.”
Note: These are *not* the same as Unclassified areas (see explanation above for “Unclassified”).)

NOTE: All Federal PM10 nonattainment areas were originally classified as “Moderate” in 1987 at the initial promulgation of the National PM10 standards, with an attainment deadline of 1994. Those areas not meeting the 1994 deadline requested an extension, and were automatically re-classified as “Serious” with a new deadline of 1999.

COVERAGE NAME: FED_NO2

Concise Summary:

This layer is a statewide polygon coverage for Federal Nitrogen Dioxide Designation and Classification, which together give an indication of the air quality status of areas in California with respect to the Federal standard for nitrogen dioxide.

The Federal “**Designation**” of an area indicates whether the area is in compliance with the National Ambient Air Quality Standard for a specific pollutant. Federal Designations are made by the U.S. Environmental Protection Agency (US EPA), on a periodic basis using the most recent monitoring data. For areas in California, the Designations with respect to the National standard for nitrogen dioxide [annual average] are as follows:

- Nonattainment: The National standard for nitrogen dioxide is currently violated in the area. Federal conformity requirements apply. Note: There are currently no nitrogen dioxide nonattainment areas in California.
- Attainment-Maintenance: The area was designated as nonattainment at the time of the 1990 Clean Air Act Amendments, but the National standard for nitrogen dioxide is not currently violated in the area, and US EPA has officially declared the area as currently in attainment. A maintenance plan has been approved to keep the area from violating the standard again. Conformity requirements also apply.
- Attainment: The National standard for nitrogen dioxide was not violated at the time of the 1990 Clean Air Act Amendments, and the area has not been declared nonattainment since. Conformity requirements do not apply. Note: For nitrogen dioxide, the Federal “Attainment” designation is not specifically distinguished from the “Unclassified” designation.
- Unclassified: There are insufficient data to indicate whether the National standard is violated in the area. Conformity requirements do not apply. Note: This term is intended to indicate that there is no designation, *not* that there is no classification – it is a misnomer widely used in air quality.
- Unclassified/Attainment: This is to indicate that the area may be considered as being designated either "Unclassified" or "Attainment". In most cases, there were insufficient data available, but the designating agency had determined that the area may be considered as "Attainment" even in the absence of complete data, or that there was not substantial difference in the definitions between the two categories for this pollutant.

NOTE: The “**Classification**” is a subdivision within the Nonattainment designation. There are currently no nitrogen dioxide nonattainment areas in California, and thus no classifications for nitrogen dioxide are currently being used. For historic record and to accommodate any future re-designations, the following classifications and pseudo-classification may be used:

- Serious;
- Moderate;
- Nonattainment-No Classification: Some nonattainment areas do not have classifications, and are indicated by the label “Nonattainment-No Classification.” Note: These are *not* the same as Unclassified areas (see explanation above for “Unclassified”).

COVERAGE NAME: FED_SO2

Concise Summary:

This layer is a statewide polygon coverage for Federal Sulfur Dioxide Designation and Classification, which together give an indication of the air quality status of areas in California with respect to the Federal standards for sulfur dioxide.

The Federal “**Designation**” of an area indicates whether the area is in compliance with the National Ambient Air Quality Standard(s) for a specific pollutant. Federal Designations are made by the U.S. Environmental Protection Agency (US EPA), on a periodic basis using the most recent monitoring data. For areas in California, the Designations with respect to the National standards for sulfur dioxide [24-hour and annual averages] are as follows:

- Nonattainment: The National standards for sulfur dioxide are currently violated in the area. Federal conformity requirements apply. Note: There are currently no sulfur dioxide nonattainment areas in California.
- Attainment: The National standards for sulfur dioxide were not violated at the time of the 1990 Clean Air Act Amendments, and the area has not been declared nonattainment since. Conformity requirements do not apply.
- Unclassified: There are insufficient data to indicate whether the National standards are violated in the area. Conformity requirements do not apply. Note: This term is intended to indicate that there is no designation, *not* that there is no classification – it is a misnomer widely used in air quality.
- Unclassified/Attainment: This is to indicate that the area may be considered as being designated either "Unclassified" or "Attainment". In most cases, there were insufficient data available, but the designating agency had determined that the area may be considered as "Attainment" even in the absence of complete data, or that there was not substantial difference in the definitions between the two categories for this pollutant.

NOTE: The “**Classification**” is a subdivision within the Nonattainment designation. There are currently no sulfur dioxide nonattainment areas in California, and thus no classifications for sulfur dioxide are currently being used. For historic record and to accommodate any future re-designations, the following classifications and pseudo-classification may be used:

- Serious:
- Moderate:
- Nonattainment-No Classification: Some nonattainment areas do not have classifications, and are indicated by the label “Nonattainment-No Classification.” Note: These are *not* the same as Unclassified areas (see explanation above for “Unclassified”).